

wide [Stage I(n=858): 0.906(0.006); Stage II(n=1,091): 0.912(0.005); Stage III(n=119): 0.857(0.018); Stage IV(n=13): 0.780(0.071)]. EQ-5D was not significantly different by 4-stage disease severity but showed a trend of deterioration in Stage III and IV. In the post-hoc analysis, COPD patients were divided into two-stage groups [group 1: Stage I and II; group 2: Stage III and IV]. In this analysis, 2-stage severity had a negative association with utility ($p=0.0009$). **CONCLUSIONS:** The results demonstrate that COPD impairs utility and shows a relationship between utility and COPD disease severity in Korea.

PRS21

FACTORS CONTRIBUTING TO QUALITY OF LIFE IN COPD IN SOUTH KOREA

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OBJECTIVES: The burden of COPD is increasing in Korea. Health-related quality of life among COPD patients should be considered. Few national strategies to prevent and manage COPD have been intervened. In this study, we investigate the factors associated with COPD patients' quality of life. **METHODS:** Data of Korean National Health and Nutrition Examination Survey (KNHANES) 2007–2012 were used. Multivariate regression analysis was employed. Demographic variables (e.g. sex, age), socioeconomic status (SES) variables including education, insurance type, comorbidities (e.g. hypertension, diabetes, depressive disorder, cancer), severity of COPD, smoking were considered as independent variables. **RESULTS:** We found that female ($\beta=-0.0387$, $p<0.0001$), age ($\beta=-0.0021$, $p<0.0001$), Medical aid beneficiaries ($\beta=-0.1001$, $p<0.0001$) showed a significantly lower score of EQ5D index. Mild ($\beta=0.2001$, $p<0.0001$), moderate ($\beta=0.1982$, $p<0.0001$), severe ($\beta=0.1765$, $p<0.0001$) had significantly higher scores compared to that of very severe stage (GOLD IV). Education level also an important factor. Lower level of education (graduation from middle school or less) showed a negative association with EQ5D index score. Depression among comorbidities significantly worsened the quality of life of COPD patients ($\beta=-0.7420$, $p<0.0001$). Smoking status (current smoker, ex-smoker, non-smoker) did not show a significant difference. **CONCLUSIONS:** Socio-economic status of COPD patients including sex, age, education level and insurance type, were important factors related to the health-related quality of life. After controlling these factors, severe and depressive COPD patients reported their quality of life was significantly worsened. Strategies for COPD prevention and management should be developed and implemented. Improvement of health-related quality of life in COPD can be considered as an index of goals to achieve.

PRS22

HEALTH-RELATED QUALITY OF LIFE FOR PATIENTS WITH CHRONIC OBSTRUCTIVE PULMONARY DISEASE IN SOUTH KOREA

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OBJECTIVES: COPD is known as a disease with irreversible progress but preventable and manageable. In Korea, COPD was ranked 12 with 242 DALYs (per 100,000) following diabetes (970 DALYs), cerebrovascular diseases (937 DALYs) and asthma (709 DALYs). Health-related quality of life in COPD patients has not been investigated in Korea. **METHODS:** Data of Korean National Health and Nutrition Examination Survey (KNHANES) 2007–2012 were used. According to the GOLD criteria, we classified COPD patients into I–IV grades. EQ-5D index score were analysed by the severity of COPD and Comorbidities. Wilcoxon rank-sum test were used to compare quality of life in COPD patients with that of the general population. SAS 9.3 version was used for analysis. **RESULTS:** Utility score for the general population was 0.9291 ± 0.1320 while COPD patients were scored 0.9042 ± 0.1478 showing a significant difference ($p<0.0001$). Comorbidities demonstrated a significant impact on the quality of life among COPD patients. Patients with hypertension (0.8863 ± 0.1574), diabetes (0.882831 ± 0.169179), cancer (0.8675 ± 0.1691), and depression (0.8089 ± 0.1784) showed a significantly lower utility score than those without comorbidities ($p<0.0001$, $p=0.0042$, $p<0.0001$, $p=0.0687$, respectively). According to the severity, mild (0.905754 ± 0.140629) and moderate (0.9090 ± 0.1465) COPD patients had a similar EQ5D index score. However, severe (0.8722 ± 0.1724) and very severe (0.6816 ± 0.2705) stages showed a significantly lower quality of life. We also found that diagnosed rate among COPD patients was only 2.96%. **CONCLUSIONS:** As severity of COPD has shown a great impact on quality of life, preventable strategy and management should be developed. Especially early diagnosis and early detection will be the first step to take for COPD management in South Korea. To do so, interdisciplinary approach should be made.

RESPIRATORY-RELATED DISORDERS – Health Care Use & Policy Studies

PRS23

PERCEPTION PATTERN ANALYSIS OF SELF-MEDICATION PRACTICES AMONG PEOPLE IN SOUTHERN DISTRICT OF KARNATAKA, INDIA

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OBJECTIVES: To determine the pattern of self-medication among the people of region and to evaluate the factors associated with self-medication. **METHODS:** The data for this study was collected by the survey method in community pharmacies. This was done by directly approaching the consumer for self-medication during the study period for their own use or as messengers for others. The structured research instrument was a simplified questionnaire, which sought information on demographic background and self-medication practices. The elicited data include demography, use of drug without doctor's prescription, type of drug used,

reasons for self-medication, factors that influenced the choice of drug and source of drug. **RESULTS:** People of all socio-demographic categories practice self-medication. A total of 76.8% of the respondents indulged in self-medication practices. Of which, 33.0% used the medication inappropriately. The most frequently self-diagnosed illnesses or symptoms of illnesses were: GI illnesses, cough/cold and headache/fever. Of these illnesses, more than 35% were less than 24 hours duration and nearly 80% less than seven days duration of illness. The reasons given by respondents for self-diagnosis and self-medication were non-seriousness of the illnesses, for emergency use and prior experience about the illness with similar symptoms (39.7%) and even advice of non-physician health professional (33.5%). Whatever the duration of illnesses and reasons for self-diagnosis, nearly 65% requested drugs by mentioning the names of the drugs and more than one-fifth by telling the symptoms of their illnesses. Requests for analgesics/antipyretics were very high (60%) followed by antimicrobial drugs (40%) for all reported illness. Drug requested mostly in other conditions include cold/cough suppressants, Gastro Intestinal drugs and very low for ORS. **CONCLUSIONS:** The level of inappropriate drug use denotes self-medication as an unhealthy option, and it therefore, should be discouraged.

PRS24

DURATION OF TREATMENT IN PULMONARY TUBERCULOSIS: ARE INTERNATIONAL GUIDELINES ON THE MANAGEMENT OF TUBERCULOSIS MISSING SOMETHING?

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OBJECTIVES: The study aimed to document the duration of tuberculosis (TB) treatment, and its relationship with the characteristics of the patients. **METHODS:** This prospective follow-up cohort study was conducted at the chest clinic of Penang General Hospital between March 2010 and February 2011. Medical records and TB notification forms of all new smear positive pulmonary tuberculosis (PTB) patients, who were diagnosed during the study period, were reviewed to obtain socio-demographic and clinical data. Based on the standard guidelines, the normal benchmarks of treatment duration for the intensive- and continuation phase of TB treatment were taken as 2 and 4 months, respectively. A patient in whom the clinicians decided to extend the intensive phase (IP) for ≥ 2 weeks was categorized as a case of prolonged IP. The same criterion applied for the continuation phase (CP) of the treatment. **RESULTS:** Out of the total 336 patients, 261 completed the IP of the treatment. Subsequently, 226 completed the CP. The average duration of TB treatment ($n = 226$) was 8.19 (SD 1.65) months. 49.4% (129 out of 261) patients completed the IP in 2 months, whereby only 37.6% patients (85 out of 226) completed the CP of the treatment in 4 months. In multiple logistic regression analysis, being a smoker, body mass index less than normal and a history of ≥ 4 weeks cough were the predictors of longer duration of the IP, while diabetes mellitus and presence of lung cavities were the only predictors of longer duration of the CP of the treatment. **CONCLUSIONS:** The average duration of treatment in new smear positive PTB patients was longer than the targets set by World Health Organization. There is lacking a uniform international criterion to evaluate how well National Tuberculosis Program of Malaysia has performed in terms of managing duration of treatment in PTB patients.

PRS25

THE EFFECT OF BACTERIAL LYSATES ON PATIENTS WITH RECURRENT RESPIRATORY TRACT INFECTIONS: A META-ANALYSIS

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OBJECTIVES: The use of bacterial lysates as an immuno-modulator to boost immunological response in patients with Recurrent Respiratory Tract Infections and its effects on the attack frequency of respiratory infection have been widely debated. We aimed to conduct our meta-analysis on the effect of bacterial lysates plus routine care versus routine care only on the attack frequency of respiratory infection in patients with Recurrent Respiratory Tract Infections. **METHODS:** We performed a systematic review of articles published from Jan 1, 2000 to Nov 10, 2013 by searching PubMed, Embase, Cochrane Central Register of Controlled Trials, and Wanfang and China National Knowledge Infrastructure. We included all randomised trials that compared outcomes between patients with Recurrent Respiratory Tract Infections receiving bacterial lysates plus routine care with those receiving routine care only. Eligible studies, determined by consensus with predefined criteria, were reviewed and data were extracted onto a standard form. We combined data to assess the primary outcome of attack frequency of respiratory infection using the DerSimonian and Laird random effects model. **RESULTS:** Our search identified 128 reports, of which twelve studies met our inclusion criteria and were included in our meta-analysis. Analysis of the 12 randomised trials (959 patients) that reported an outcome on the attack frequency of respiratory infection showed that patients assigned to bacterial lysates plus routine care had a 2.942 reduction in respiratory tract infections compared to those assigned to routine care only (Weighted Mean Difference -2.942, 95% CI -3.600, -2.284). **CONCLUSIONS:** Bacterial lysates are associated with a decreased risk of respiratory tract infections in patients with Recurrent Respiratory Tract Infections. Further studies are needed to identify the causes of respiratory tract infections and to assess whether the attack frequency of respiratory infection differs with varying treatments of bacterial lysates.

PRS26

SMOKING CESSATION TREATMENT PATTERNS AND CHARACTERISTICS OF PATIENTS WITH COPD WHO ARE ATTEMPTING TO QUIT IN URBAN CHINA

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